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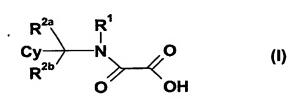
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(54) Title: SUBSTITUTED METHYLENE AMIDE DERIVATIVES AS MODULATORS OF PROTEIN TYROSINE PHOSPHATASES (PTPS)



(57) Abstract: The present invention is related to substituted methylene amide derivatives of formula (I) and use thereof for the treatment and/or prevention of metabolic disorders mediated by insulin resistance or pyperglycemia, comprising diabetes type I and/or II, inadequate glucose tolerance, insulin resistance, hyperlipidemia, hypertriglyceridemia, hypercholesterolemia, obesity, polycystic ovary syndrome (PCOS). In particular, the present invention is related to the use of substituted methylene

amide derivatives of formula (I) to modulate, notably to inhibit the activity of PTPs. Also the present invention relates to a method of treating diabetes type II, obesity and to regulate the appetite of mammals. The present invention is furthermore related to novel substituted methylene amide derivatives and method of preparation thereof. Formula (I).

INSERNATIONAL SEARCH REPORT

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A. CLASSIFICATION OF SUBJECT MATTER IPC 7 C07C237/42 A61K31/16 C07D333/34 C07C317/32 C07C233/56 CO7D211/26 A61P3/10 C07C317/32 C07C255/60

According to international Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols) IPC 7 C07C A61K A61P C07D

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

CHEM ABS Data, EPO-Internal, WPI Data

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Y Further documents are listed in the continuation of box C.	Patent family members are listed in annex.		
"A" document defining the general state of the art which is not considered to be of particular relevance "E" earlier document but published on or after the International filling date "L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) "O" document referring to an oral disclosure, use, exhibition or other means "P" document published prior to the international filling date but later than the priority date claimed	 *T* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention *X* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone *Y* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art. *&* document member of the same patent family 		
Date of the actual completion of the international search	Date of mailing of the international search report		
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Name and mailing address of the ISA European Patent Office, P.B. 5818 Patentlaan 2	Authorized officer		
NL – 2280 HV Rijswijk NL – 2280 HV Rijswijk Tel. (+31–70) 340–2040, Tx. 31 651 epo nl, Fax: (+31–70) 340–3016	Sánchez García, J.M.		



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